IN THE CLAIMS:

Please Amend Claim 1 to the following:

1. (Amended) A method of inducing a layer of compressive residual stress in the surface of a part comprising the steps of:

selecting a region of the part to be treated;

selecting the magnitude of compression and the residual stress distribution to be induced at particular points along the surface of the selected region;

exerting pressure against the surface of the selected region, the pressure being applied in a selected pattern along the surface to form zones of deformation having a deep layer of compressive stress; and

varying the pressure and the rate of pressure variation being exerted against the surface to produce the desired residual stress distribution and magnitude of compression within the surface.

11. (Amended) A method of inducing a layer of compressive stress in the surface of a part comprising the steps of:

selecting a region of the part to be treated;

selecting the magnitude of compression and the residual stress distribution to be induced in the surface of the selected region;

programming a control unit to pass a burnishing member of a burnishing apparatus over the selected region in the selected pattern to produce a zone of deformation having a deep layer of compression within the surface; and

programming the control unit to increase, decrease or maintain the pressure being exerted against the surface at selected points along the selected pattern and to vary the rate of increase and decrease of pressure to obtain the desired residual stress distribution and magnitude of compression within the surface.